It is important to emphasize that an integral part of B2 is the basic service rate and the prices for equipment used to receive basic service. Given that today, and perhaps for some time to come, the cable industry does not necessarily tier its services as it will under the statute, the B1 and B2 benchmarks cannot be separated. For example, many cable systems offer only one non-premium tier of service.

B2		
Basket of all regulated subscriber services and equipment. Benchmark standard based on upper tail of overall industry price distribution.	•	average basic service revenue per subscriber
	plus:	monthly rate(s) for non-basic tier(s) (weighted by percent of basic subscribers buying tier)
	plus:	monthly rate for converter (weighted by number of converters per subscriber)
	plus:	monthly rate for remote (weighted by number of remotes per subscriber)
	plus:	monthly rate for additional outlets (weighted by number of additional outlets per subscriber)
	plus:	1/36 of installation fee
	equals:	average regulated revenues per subscriber
	divided by:	weighted average channels per subscriber
	equals:	average revenue per regulated subscriber-channel: B2

There are several reasons in addition to the language of the statute to use baskets that take into account *all* tiers of service and all regulated items of equipment when establishing benchmarks for cable programming services. First, the ratios of the various service and equipment rate components to one another are likely to vary considerably among the competitive benchmark sys-

tems. If so, variation in rate elements in response to local conditions is competitively legitimate, and not merely a feature of non-competitive system pricing. Second, with regard to cable programming services, it is reasonable to suppose that Congress intended that overall subscriber charges be limited, rather than individual components, because regulation of individual components increases substantially the regulatory burden on both franchise authorities and systems. Thus, pricing should be evaluated on an aggregate basis for the subscriber that chooses a level of service beyond the basic level. Third, subscriber interests are best served within the overall framework of regulation by providing systems with flexibility to reprice their services in response to changing competitive conditions. If rate hearings are triggered by program service rate adjustments that simply offset reduced equipment or basic service rates, there will be far more proceedings, and far more public resources devoted to an essentially fruitless task.

For example, suppose that the Commission adopted a rule that prices for remote controls could not exceed $2 per month. In that case, the B2 basket approach would permit individual cable operators to change any prices in the basket, provided that the basket rate did not exceed the benchmark and the remote control rate did not exceed $2. As a practical matter, this avoids a rate hearing for the case where a cable operator has to lower the remote control price from $3 to $2, and consequently increases the rate for cable programming service from $18 to $18.75 to keep revenue unchanged, but $18.75 exceeds the (disaggregated) benchmark cable programming service rate for that system. Another way to put this is that regulatory *baskets* do not require or imply cable operator *bundling* and do not preclude itemized equipment rate caps.

Establishing benchmarks

To identify systems with exceptionally high prices, the Commission must first distinguish those rates that are "unreasonably" high from those that are high for reasons unrelated to the purposes of the statute. This is done by the same process of statistical identification of factors that explain rate variation described above in connection with basic service. While the factors that are taken into account in explaining overall average regulated service revenues per subscriber (rates for the B2 basket) need not necessarily be the same as those used to establish the B1 benchmarks, it is likely as a statistical matter that they will be similar. As before, and using the same policy criteria, some of the factors can be used to form a grid or a table, into a cell of which each system will fall. Nevertheless, there will remain a range or distribution of B2 rates[26] in each cell. The benchmark standard would single out those systems with the highest statistically unexplained average subscriber revenues as presumptively unreasonable. The remaining systems would be regarded as having reasonable program service rates.

For example, consistent with the suggestion in the Notice of selecting "systems which ranked among the highest few percent (*e.g.*, top 2–5%)" (¶46), the 95th percentile of the distribution of average revenue for subscribers or systems would be a possible benchmark standard for B2. Choice of the 95th percentile of B2 values as the benchmark rate has two justifications. First, this benchmark has salience as a commonly accepted standard for statistical signifi-

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26 The term "B2 rates" is used for shorthand purposes, but it should be recognized that B2 is not itself a "rate" but rather an average revenue number calculated in order to test the rates charged for cable programming services.

cance. Second, because non-basic rates are regulated at the federal level, the practical ability of the Commission to process fairly and adequately the complaints of a larger fraction of the nation's cable subscribers must be taken into consideration. Table 1 shows the approximate consequences of alternative standards.[27]

Table 1: Regulatory Burden of Various Benchmarks

B2 Standard	Subscribers Eligible to Complain to FCC	Number of Systems Subject to Proceedings
99th percentile	552,000	111
95th percentile	2,760,000	554
90th percentile	5,520,000	1,109

The process by which the Commission would establish federal regulation of cable programming service rates can be summarized as follows. First, the Commission would collect annually data as described above on the overall regulated subscriber and equipment rates (average subscriber revenues for the B2 basket) of cable systems in the United States, and use statistical analysis to identify the economic factors that explain variations in those rates. Second, the factors would be used to form a grid or table. Systems serving the upper 5 percent, for example, of the distribution of subscribers in each cell would be identified as having potentially unreasonable overall rates, and therefore unreasonable rates for cable programming services. Third, complaints from subscribers to these systems would be accorded a presumption of legitimacy, which the system

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27 Table 1 assumes that the same percentage of cable subscribers and cable systems are affected by the regulations. However, in practice the percentage of cable systems affected could differ from the percentage of subscribers affected depending upon the distribution of affected subscribers across systems by system size.

could rebut by relying on factors contained in the Act to defend their rates. Rates of systems not in the upper tail of the distribution would be reasonable, and subscriber complaints regarding such systems would be denied.

A MECHANISM FOR RATE ADJUSTMENTS

Once initial benchmarks are established for B1 and B2, each cable system can determine whether its rates fall above or below the benchmark. But cost and other conditions change over time, particularly in a business as dynamic as the cable industry. It therefore will become necessary for the Commission to adjust the benchmarks. Moreover, the reactions of individual cable operators to the establishment of the benchmarks will themselves alter the distribution of rates, a fact that must be taken into account.

Adjusting the B1 benchmark

To keep up with changing conditions, the B1 benchmark rates should be adjusted annually based on changes in the median rate of the benchmark competitive systems. This will in principle take account of increased costs of service due to inflation, decreased costs of service due to technological innovation, and the addition of new programming services. The procedure would require calculating the median value of B1 for those competitive systems used in calculating the competitive adjustment holding constant the factors that are incorporated in the B1 benchmark rate tables. The median value would be calculated at the time the regulations are established and annually thereafter, using the same methodology. The percentage change in the median value would then be applied to the initial benchmark rates. When testing the rates of any cable system against the applicable benchmark, an adjustment will be required to account for inflation between the time of the benchmark survey and the time of the test.

Adjusting the B2 benchmark

The B2 benchmark rates also should be adjusted annually based on changes in the median rates of regulated systems. Looking at the median value rather than the average value will alleviate the tendency for the distribution of B2 rates to collapse as the systems in the upper tail reduce their rates to come into compliance with the benchmarks. As with B1, the procedure involves calculating the median value of B2 for regulated systems holding constant the factors that are incorporated in the B2 benchmark rate tables. The median value would be calculated at the time the regulations are established and annually thereafter, using the same methodology. The percentage change in the median value would then be applied to the benchmark rates. An inflation adjustment between surveys will be required.

Adjustments in rates by those systems below the benchmarks

For B1, annual adjustments to actual rates should be limited only by the current benchmark.[28] There should be pass throughs for new program services, rate increases for old program services, new PEG costs, and retransmission fees paid by cable systems to broadcasters. "Pass through" means direct cost plus overhead plus reasonable profit. Neither new PEG costs—generally associated with franchise renewals—nor any broadcast retransmission fees would be reflected in the initial distributions and thus must be taken into account sepa-

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28 It is difficult to make economic sense of the assumption that all systems with rates lower than the benchmark could or would wish to raise their rates to the benchmark. Establishment of the benchmark itself changes little in the constellation of economic and subscriber-relations factors that today constrain rates for, say, 95 percent of all subscribers to be less than that B2 benchmark.

rately. Similarly, consistent with the statute, franchise fees and taxes should also be passed through. Programming pass throughs are needed, despite their possible effects on incentives, in order to encourage the continued rapid development of new programming services. Since any new program service (or new PEG services) might change certain factors (e.g., number of channels) taken into account in the benchmark rate table, the pass through is needed to the extent necessary to cover costs-plus of the service not fully accounted for in the benchmark tables. This provision is required in order not to discriminate against new program services with above-average quality and fees.

For B2, there should be no limits on the annual increases in rates for service tiers above the basic service tier as long as the B2 benchmark is not violated. There should be pass throughs as with B1, especially for increased programming costs.

Increased demand

No system should be held to violate the B2 benchmark merely on account of an increase in its output. Suppose a system with its rates and quantities sold as of April 1, 1993 is just below the Commission's B2 benchmark rate applicable to that system. Over the next several months, as a result of successful marketing efforts and without changing its rates, the system increases the number of subscribers taking remote controls or additional outlets. This by itself might have the effect of increasing the average revenue per subscriber and might put the system above the B2 benchmark rate.[29]

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29 A similar problem may arise if the cable system increases subscriptions to one of its tiers holding rates constant (although since the subscriber-weighted number of chan-

The way to deal with the problem of increased demand in the presence of constant rates is to use as weights (in computing the weighted average of rates that comprises B2) the quantities sold as of the benchmark date, rather than the test date.[30]

Rate Changes

Rate changes should be evaluated using output quantities just prior to the rate change. Consider a case where the system is in compliance with the B2 benchmark and it wishes to raise its rates as of January 1994. In evaluating the reasonableness of the new rates the Commission should calculate the system's B2 using the proposed new rates weighted by the subscriber percentages at the time the rate increase is proposed, rather than the subsequent percentages. If this value is below the benchmark rate then the new rates should be allowed.

One potential problem is that the system might be above the benchmark rate prior to the proposed rate change simply because of prior changes in demand, as discussed above. Even if the system proposed to *reduce* its rates it

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nels also increases it is also possible that the system's actual computed average revenue will not change or will decrease).

30 Here is an example: A cable system with an applicable B2 benchmark of—say—$0.84 per channel as of April 1, 1993, engages in a successful marketing program that increased penetration of remote controls from its initial 10 percent to 40 percent by October 1993. Suppose its actual B2 as of April 1, 1993 was $0.75, well below the benchmark. In computing the actual B2 for that system as of October 1993, the Commission should use the 10 percent weight rather than the 40 percent weight for remote controls. If the rates themselves were not changed, the calculated actual B2 for that system would not change. This interpretation of the benchmark is pro-competitive because it does not discourage output expansion efforts.

might still be above the benchmark. Since the Commission should not discourage rate decreases, or be concerned about rate increases that do not change average revenue from subscribers whose selections do not change, one way to resolve this would be to find the new rates not unreasonable if the B2 under the proposed new rates is less than the B2 under the old rates, with both values of B2 calculated using the subscriber percentages just prior to the time the rate increase is proposed. Hence, the new rates would be not unreasonable if they produced an average revenue below the benchmark rate or below the system's average revenue just prior to the rate increase, using weights from just prior to the increase, regardless of their ultimate effect on actual average subscriber revenue.

Retiering

In computing B2 after a realignment of program services by a cable system, the Commission should use the weights that were applied to individual services prior to the change. Consider a situation where a system wants to retier its existing channels and reprice those tiers. This rearrangement can be evaluated using the same criteria employed in evaluating a rate change. The subscriber weight given to any pre-existing retiered channel would be the same weight that channel received prior to retiering. The subscriber percentage assigned to each proposed new tier would be the weighted average of the percentages given to each of the old tiers, with the weights equal to the percentage of channels on the new tier that were from that old tier. Once this new B2 is calculated, it would be compared to the benchmark rate and the system's old B2 as was done when evaluating a rate change. Entirely new tiers made up of entirely new program services would fall under the pass through provisions.

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